

USOR/MCC Aerial Map



USOR/MCC Closer View



- ✗ Before Cleanup
- ✓ During Cleanup
- ✓ After Cleanup

9828280

EPA Removal Actions 2010 – 2011

USOR Property – Acid Tank Secondary Containment

✗ The secondary containment for the acid tank (40) deteriorated and leaked oily pH 1 liquid

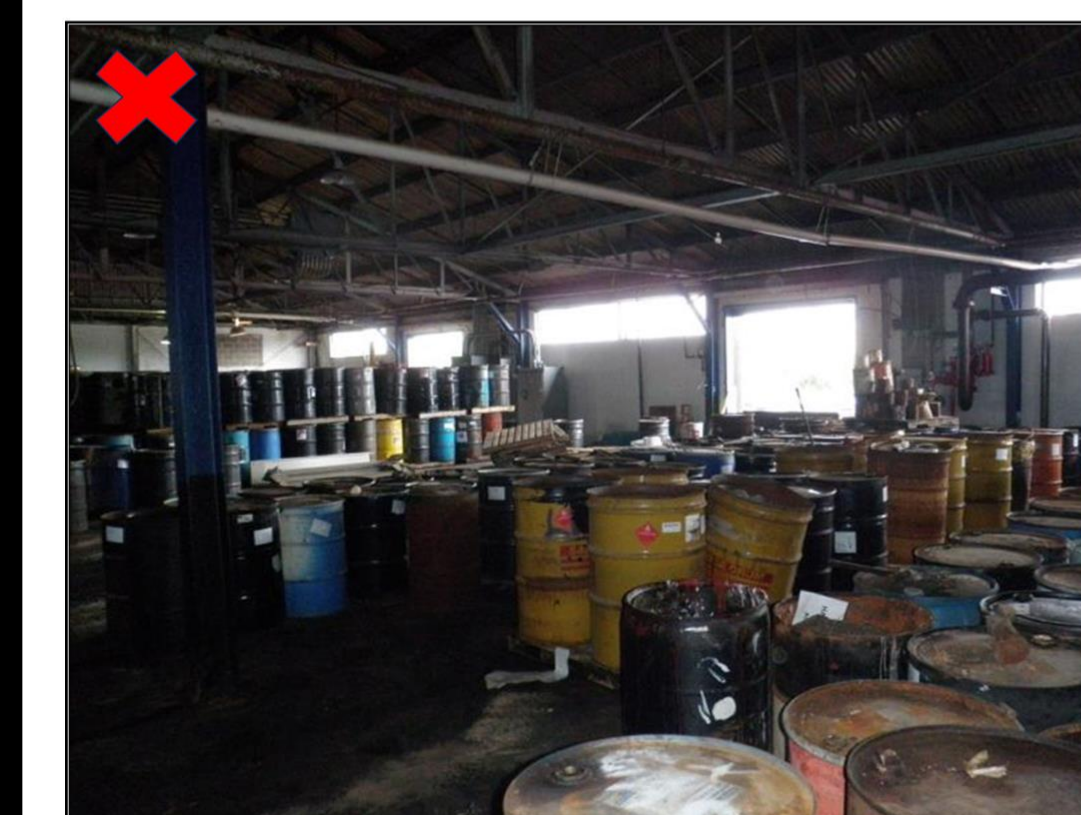
✓ The tank was removed, contents of the secondary containment were removed, and the corroded concrete leak was repaired



USOR Property – Warehouse Drum Storage

✗ Drums stored in no particular order and inaccurate labels
✗ Incompatibles side-by-side
✗ Corrosives stored in metal drums

✓ Drums were sampled, field screened, stored in appropriate containers
✓ Sorted by hazard characteristics on poly with containment and proper signage



USOR Property – North Tank Farm Secondary Containment

✗ Oily liquids/sludge and high benzene
✗ Signs of overflow on the north and east sides

✓ Emptied and spray washed



USOR Property – Parking Lot

✗ Containment overflow and storm water in parking lot
✗ During rain overflow into Vince Bayou about 25-50 feet from fence line

✓ Parking lot emptied and spray washed



MCC Property

✗ Staining from pump house down gradient into Vince Bayou (pumps were removed by operators, however piping was not sealed).
✓ The pipes were capped shut.

✗ Chlorine Contact Chamber, fractured concrete in NW corner draining into Vince Bayou
✓ The level was dropped and concrete repaired



EPA Response Action Summary

- ✓ Mitigation of immediate threat to public and Vince Bayou
- ✓ Prevention of off-site migration
- ✓ Site Stabilization

Summary of Wastes Taken to Permitted Disposal Facilities

Hazardous sludge (Benzene):	12,000 gallons
Hazardous sludge washout (Benzene):	5 drums
Nonhazardous sludge:	90 tons
Nonhazardous liquid/recycling/fuels blending:	833,500 gallons
PPE/Solids:	10 cubic yards

US Oil Recovery Superfund Site, Pasadena TX

PRP Group Removal Actions 2011 – present

USOR Property – Bioreactor Removal July 2012 – April 2014



USOR Property – Bioreactor Removal contd.

- Details:**
- 500,000 gal of liquid removed
 - 150,000 gal of slurried solids removed
 - Structure pressure washed and demolished (800 cubic yard debris removed)
 - Sent to permitted disposal facilities



USOR Property Roll-off Boxes August 2013 – March 2015

- 80,000 gal of liquid (not including washout) removed
- 400,000 gal of solids (including cutter) removed 600 tons of nonhaz solids (including ash)
- 100 tons haz solids from Frac tank removed



USOR Property – Emptied Warehouse March 2014 – January 2015

- ✓ Approx 1,107 containers (drums and totes) removed;
- ✓ Approx. 28,000 gal of container contents shipped in bulk for disposal



- ✗ Before Cleanup
- ✓ During Cleanup
- ✓ After Cleanup

USOR Proposed Sampling Locations



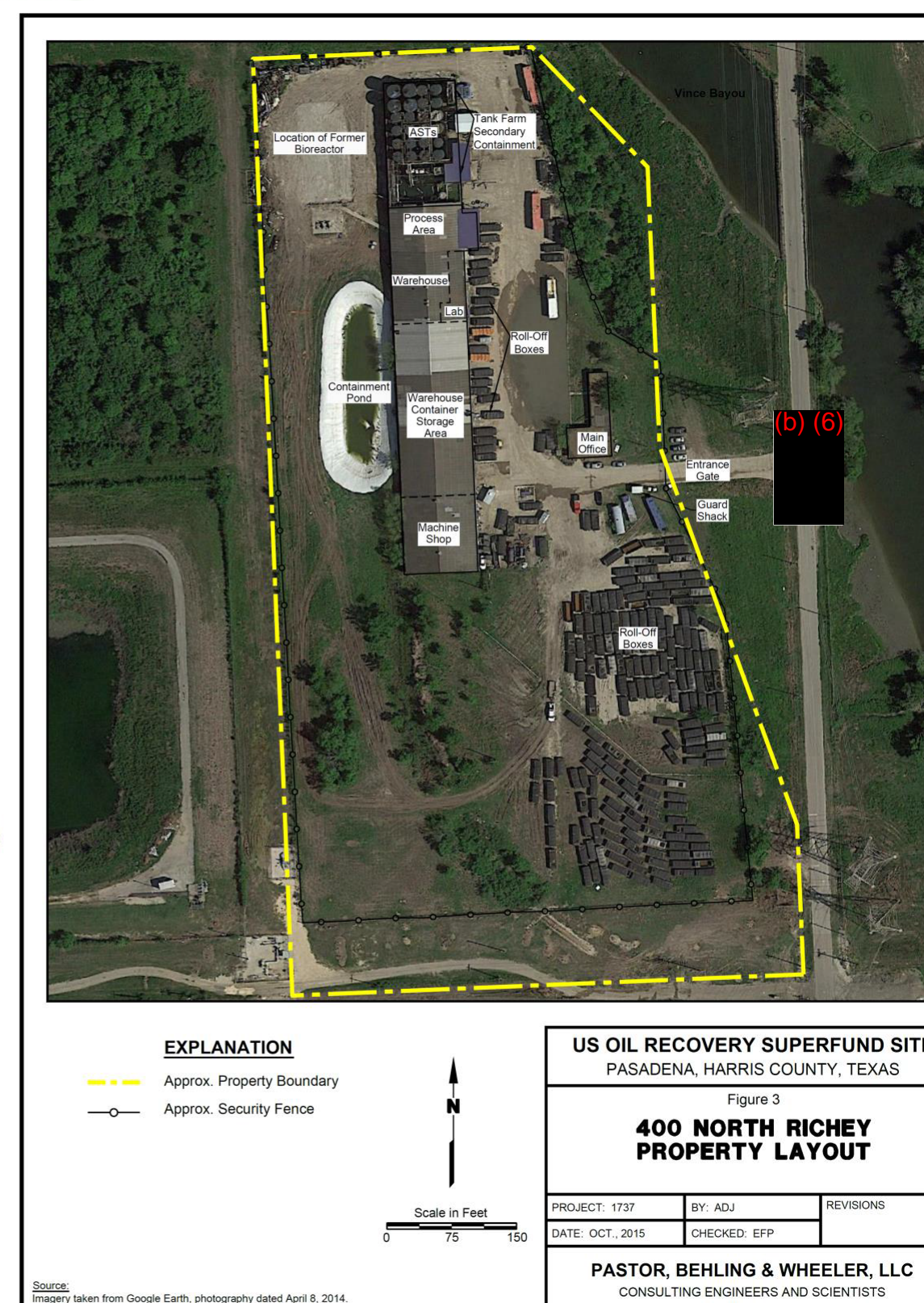
Containment Pond Drawdown Dec 2013 – Jan 2016

- Drawdown of 1,400,000 gal of storm water



PRP Removal Actions Completed

- ✓ Bioreactor removed
- ✓ Drums removed – warehouse empty
- ✓ Roll-off boxes empty
- ✓ Containment pond freeboard available
- ✓ Aboveground storage tanks liquids removed
- ✓ Process equipment liquids and solids removed



PRP Group Removal Actions Summary

- ✓ Mitigation of short-term threat to public and Vince Bayou
- ✓ Site Stabilization
- ✓ Prevention of off-site migration

Summary of Wastes taken to Permitted Disposal Facilities

Liquids:-----3 million gallons
Solids:-----600,000 gallons
Containers:-----1,160 containers
Bioreactor Debris:-----800 cubic yards
Soil/Debris/PPE:-----450 cubic yards

EPA Information and Contacts

EPA Lead - www.epaossc.org/USOilRecovery-Pasadena (EPA managed website)

PRP Lead - www.epaossc.org/USOR-PRP (EPA managed website)

Remediation - www.epa.gov/superfund/us-oil-recovery (EPA managed website)

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